

### AMENDMENTS TO THE CLAIMS

This listing of claims replaces any prior version of the claims in the application.

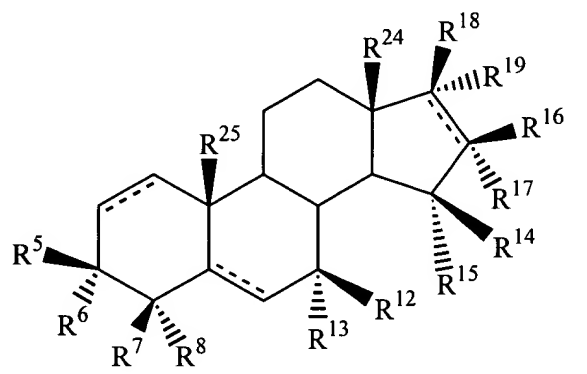
5           Claims 1-32 (cancelled).

          Claims 33-39 (withdrawn).

          Claims 40-55 (cancelled).

10

          Claim 56. (new): A method to treat an androgen responsive disease in a subject, or to ameliorate one or more symptoms, comprising administering to the subject, or delivering to the subject's tissues an effective amount of a formulation comprising one or more excipients and a compound having the structure



15

wherein,

$R^5$  and  $R^6$  independently are -H,  $-OR^{PR}$ ,  $-SR^{PR}$ ,  $-N(R^{PR})_2$ , an ester, -NH-C(O)-C1-50 organic moiety, an amino acid, a peptide, an ether, a thioether, a carbonate, a carbamate, an optionally substituted alkyl group, an optionally substituted alkenyl group, an optionally substituted alkynyl group, a monosaccharide, an oligosaccharide or a polymer, provided that at least one of  $R^5$  and  $R^6$  is a carbonate;

20

$R^7$ ,  $R^8$ ,  $R^{12}$ ,  $R^{13}$ ,  $R^{14}$ ,  $R^{15}$ ,  $R^{16}$  and  $R^{17}$  together or each independently are -H,  $-OR^{PR}$ ,  $-SR^{PR}$ ,  $-N(R^{PR})_2$ ,  $-OSO_3H$ ,  $-OPO_3H$ ,  $=O$ ,  $=S$ ,  $=CH_2$ ,  $=NOH$ , an ester, an

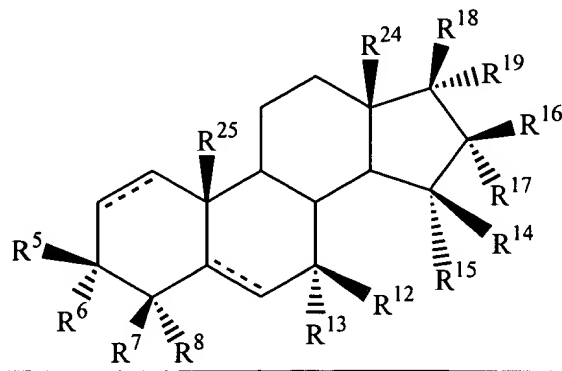
amide, an amino acid, a peptide, an ether, a thioether, an acyl group, a carbonate, a carbamate, a sulfonamide, a halogen, an optionally substituted alkyl group, an optionally substituted alkenyl group or an optionally substituted alkynyl group; and

5            $R^{18}$  and  $R^{19}$  together or each independently are -H,  $-OR^{PR}$ ,  $-SR^{PR}$ ,  $-N(R^{PR})_2$ ,  $=O$ ,  $=S$ ,  $=CH_2$ ,  $=NOH$ , an ester,  $-NH-C(O)-C1-50$  organic moiety, an amino acid, a peptide, an ether, a thioether, a carbonate, a carbamate, an optionally substituted alkyl group, an optionally substituted alkenyl group, an optionally substituted alkynyl group, a monosaccharide, an oligosaccharide or a  
10 polymer, provided  $R^{18}$  or  $R^{19}$  is  $-OR^{PR}$ ,  $-SR^{PR}$ ,  $-N(R^{PR})_2$ ,  $=O$ ,  $=S$ ,  $=NOH$ , an ester,  $-NH-C(O)-C1-50$  organic moiety, an amino acid, a peptide, an ether, a thioether, a carbonate, a carbamate, a monosaccharide, an oligosaccharide or a polymer; and

$R^{24}$  and  $R^{25}$  independently are -H, ester, ether or optionally substituted  
15 alkyl.

Claim 57. (new): The method of claim 56, wherein the androgen responsive disease is selected from the group consisting of prostate cancer, benign prostatic hyperplasia, breast cancer, alopecia, acne, hypogonadism and  
20 hirsutism.

Claim 58. (new): The method of claim 57 wherein the compound has the structure



Claim 59. (new): The method of claim 58 wherein

(a)  $R^{18}$  is -OH, -O-C(O)-CH<sub>3</sub>, -O-C(O)-CH<sub>2</sub>CH<sub>3</sub>, and  $R^{19}$  is -H, -C≡CH or -C≡CCH<sub>3</sub>, or  $R^{18}$  and  $R^{19}$  together are =O, =S or =NOH, or

5 (b)  $R^{18}$  is -H, -C≡CH or -C≡CCH<sub>3</sub> and  $R^{19}$  is -OH, -O-C(O)-CH<sub>3</sub>, -O-C(O)-CH<sub>2</sub>CH<sub>3</sub>.

Claim 60. (new): The method of claim 59 wherein  $R^7$  and  $R^8$  independently or together are -H, -OH, -SH, -NH<sub>2</sub>, =CH<sub>2</sub>, =CHCH<sub>3</sub>, =NOH, =NOC(O)CH<sub>3</sub>, =O or  
10 =S.

Claim 61. (new): The method of claim 60 wherein  $R^{12}$  and  $R^{13}$  independently or together are -H, -OH, -SH, -NH<sub>2</sub>, =CH<sub>2</sub>, =CHCH<sub>3</sub>, =NOH, =NOC(O)CH<sub>3</sub>, =O or =S.

15

Claim 62. (new): The method of claim 61 wherein  $R^{14}$  and  $R^{15}$  independently or together are -H, -OH, -SH, =O or =S and  $R^{12}$  is -H and  $R^{13}$  is -H, -OH or -SH.

20

Claim 63. (new): The method of claim 62 wherein  $R^{16}$  and  $R^{17}$  independently or together are -H, -OH, -SH, =O, =S, -O-C(O)-CH<sub>3</sub> or -O-C(O)-OCH<sub>3</sub>.

25

Claim 64. (new): The method of claim 63 wherein  $R^5$  and  $R^6$  independently or together are -H, -OH, -SH, =O, =S, -O-C(O)-CH<sub>3</sub> or -O-C(O)-OCH<sub>3</sub>.

Claim 65. (new): The method of claim 64 wherein  $R^{24}$  is -CH<sub>3</sub>, -CH<sub>2</sub>OH, -CH<sub>2</sub>OC(O)CH<sub>3</sub>, -OC(O)CH<sub>3</sub> or -CH<sub>2</sub>OC(O)OCH<sub>3</sub> and  $R^{25}$  is -H, -CH<sub>3</sub>, -CH<sub>2</sub>OH, -CH<sub>2</sub>OC(O)CH<sub>3</sub>, -OC(O)CH<sub>3</sub> or -CH<sub>2</sub>OC(O)OCH<sub>3</sub>.

30

Claim 66. (new): The method of claim 65 wherein  $R^7$ ,  $R^8$ ,  $R^{14}$ ,  $R^{15}$  and  $R^{17}$  are -H,  $R^{16}$  is -H or -OH.

Claim 67. (new): The method of claim 66 wherein  $R^{24}$  and  $R^{25}$  are -CH<sub>3</sub>.

5

Claim 68. (new): The method of claim 67 wherein a double bond is present at the 1-2 and 5-6 positions and  $R^{24}$  and  $R^{25}$  are both -CH<sub>3</sub>.

10 Claim 69. (new): The method of claim 67 wherein a double bond is present at the 5-6 position and  $R^{24}$  and  $R^{25}$  are both -CH<sub>3</sub>.